

***Myosurus clavicaulis* Peck**
mousetail
Ranunculaceae (Buttercup Family)

Status: State Sensitive
Rank: G3?S2

General Description: Adapted from Peck (1961): This tiny annual has leaves that are linear to filamentous, spreading, and $\frac{3}{4}$ to $1\frac{1}{2}$ in. (2-4 cm) long. When fruiting, the scapes (leafless flower stalks) and flowers are shorter than the leaves in length, and are dilated towards the apex and spreading. The sepals are spatula-shaped, unequal and 3-5 nerved. At maturity the point of the flower stalk on which the flower parts are borne (receptacle) is equal to or longer than the scapes, and conspicuously curved upward. The dry, indehiscent fruits contain one seed and are scarcely diamond-shaped, abruptly contracted beneath the beak, slightly inflated, villous on the sides, and less than $\frac{1}{16}$ in. (1.5 mm) long; the beak is a half to $\frac{2}{3}$ shorter than the oblong body, and strongly keeled underneath. The seeds are oblong and olive brown.

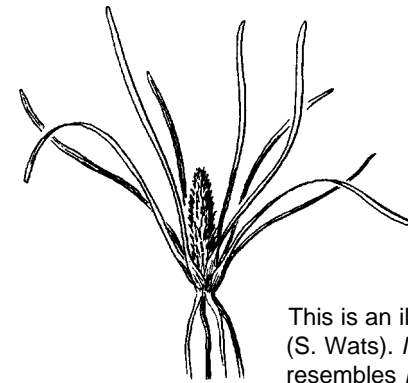
Identification Tips: *Myosurus clavicaulis* is believed to be a result of hybridization between *M. minimus* and *M. sessilis*. However, in Washington, *Myosurus clavicaulis* occurs in self sustaining populations without one or both parents, and in fact, *M. sessilis* does not occur in Washington. Within Washington *M. clavicaulis* may be mistaken for *M. minimus* but can be distinguished by the following. *M. clavicaulis* is $\frac{3}{4}$ to $1\frac{1}{2}$ in. (2-4 cm) tall and has spreading scapes and receptacles that are shorter than the leaves, while *M. minimus* is 1- $\frac{1}{8}$ to 4 in. (3-10 cm) tall and has erect or ascending scapes and receptacles that are longer than the leaves.

Phenology: In Washington the species was observed flowering, fruiting and senesced from May through June. It is identifiable even when dry.

Range: This species is only found in Washington, Oregon and California (and in California it only occurs in hybrid swarms with both *Myosurus minimus* and *M. sessilis*). In Washington it has been found in Klickitat, Lincoln, Adams and Spokane counties.

Habitat: This species was found in hard, bare, dessicated clay, in sparsely vegetated areas of shallow vernal pools, from 275 to 2400 feet (83-732 m) elevation. Associated species at one or more sites include: popcorn-flower (*Plagiobothrys* spp.), annual hairgrass (*Deschampsia danthonioides*), white-flower navarretia (*Navarretia leucocephala*), and mousetail (*Myosurus minimus*).

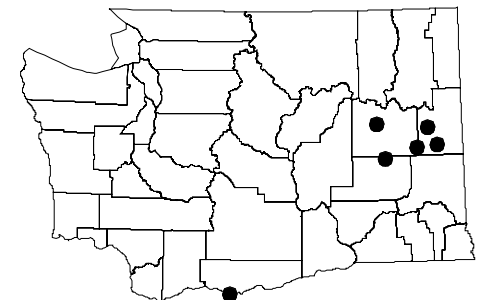
Myosurus clavicaulis
mousetail



This is an illustration of *Myosurus sessilis* (S. Wats). *Myosurus clavicaulis* closely resembles *M. sessilis*, however *M. clavicaulis* has spreading scapes rather than the upright scapes shown here (see photo).

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Illustration by Jeanne R. Janish

Known distribution of
Myosurus clavicaulis
in Washington



● Current (1980+)
○ Historic (older than 1980)

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Florence Caplow



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2005 Produced as part of a cooperative project between the Washington Department of Natural Resources, Washington Natural Heritage Program and the U.S.D.I. Bureau of Land Management. Persons needing this information in an alternative format, call (360) 902-1600 or TTY (360) 902-1125.

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Ecology: This is an obligate vernal pool species. It may not germinate in low precipitation years.

State Status Comments: There are a limited number of populations and habitat present in Washington. The species is known from less than ten recent occurrences.

Inventory Needs: Vernal pools in eastern Washington should be surveyed for additional populations.

Threats and Management Concerns: Noxious weeds are a problem and may pose a threat if vernal pools remain unflooded for several years.

Comments: The Washington occurrences of *Myosurus clavicaulis* are not recent hybrids of *M. minimus* and *M. sessilis*, but likely descendants of very old hybrid swarms. The Washington populations are self-sustaining. There are populations of *M. x clavicaulis* in California that are the result of ongoing crosses between *M. minimus* and *M. sessilis* and are not self-sustaining. This taxon is sometimes referred to as *M. minimus* L. ssp. *apus* Greene. If using Hitchcock et al. (1964) the taxon would key out to *M. minimus* L.

References:

Hitchcock, C.L., A. Cronquist, M. Ownbey, J.W. Thompson. 1964. *Vascular Plants of the Pacific Northwest Part 2: Salicaceae to Saxifragaceae*. University of Washington Press, Seattle, WA. 597 pp.

Peck, Morton E. 1961. *A Manual of the Higher Plants of Oregon 2nd Edition*. Oregon State University Press, Portland, OR. 936pp.

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